AMENDMENTS TO THE CLAIMS

Claims 1-22 were pending prior to the entry of the amendments herein. Please amend Claims 12 and 22. Please cancel Claims 1-11, 13, 15 and 18. Please add new Claims 23-25.

1.-11.   **(Canceled)**

12.   **(Currently Amended)** A method of processing a workpiece using a semiconductor workpiece processing tool including a plurality [[or]]of process modules having a robot loading window and a control system on a network, the control system including a user interface, system controller, and process module controller associated with the process modules, comprising the steps of:

       storing a production route defining movement of the workpiece among a number of the process modules, the production route including a number of on-line process modules defined in the production route and at least one off-line process module not included in the production route;

       storing a number of recipes for processing the workpiece, the recipes each having a unique name and a number of processing parameters associated therewith;

       selecting the next process module in the production route when a workpiece is substantially completed with an existing process in the production route; and

       moving the workpieces among the process modules in accordance with the selecting step.

13.   **(Canceled)**

14.   **(Original)** The method of claim 12, wherein:

       the selecting step routes the workpiece in the production route based at least in part on process module fault conditions.

15.   **(Canceled)**

16.   **(Original)** The method of claim 12, further comprising the step of:

       a selected process module retrieving a recipe over the network based on a recipe identifier.

17.   **(Original)** The method of claim 14, further comprising the step of:

       a selected process module retrieving a recipe over the network based on a recipe identifier.

18.   (Canceled)

19.   (Original) The method of claim 16, wherein:

the selecting step routes the workpiece to an available process module based on the production route.

20.   (Original) The method of claim 17, wherein:

the selecting step routes the workpiece to an available process module based on the production route.

21.   (Original) The method of claim 16, further comprising the step of:

storing process module status information; and

wherein the selecting step includes the step of using the process module status information to determine the next process module in the production route.

22.   (Currently Amended) The method of claim 12, wherein a number of the process modules include a manual loading window, and wherein:

the ~~production route includes a number of on-line process modules defined in the production route and~~ at least one off-line process module not included in the production route ~~that~~ can be configured to perform testing, maintenance or other operation while the production route is in operation.

23.   (New) The method of claim 22, wherein the storing steps include entering information through a graphical user interface.

24.   (New) The method of claim 22, further comprising the step of each process module controller retrieving a recipe over the network based on a recipe name.

25.   (New) The method of claim 22, further comprising the step of performing maintenance on an off-line process module while the production route is in operation.

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